

WHAT IS CLAIMED IS:

1. A MOS solid-state imaging element having a photodiode and an amplifier for each pixel, comprising:
  - 5 a range specifying portion for determining a density of a signal spacing between selection signals for selecting pixels to be read out according to a range in which a resolution is to be different in an image and a resolution of the range; and
  - a selection portion for sending the selection signals only to pixels that  
10 have been selected from among all of the pixels by outputting the selection signals in correspondence with a specification from the range specifying portion;
  - wherein the amplifier of a pixel to which a selection signal has been input outputs, as a pixel signal, a charge that has accumulated in the  
15 photodiode of that pixel.
2. The MOS solid-state imaging element according to claim 1, further comprising:
  - 20 a memory portion storing in advance a range in which a resolution is to be different in the image and a resolution of that range.
3. The MOS solid-state imaging element according to claim 1,
  - wherein the range in which a resolution is to be different in the image and a resolution of the range, which are specified by the range specifying  
25 portion, are dynamically changed from the outside.
4. The MOS solid-state imaging element according to claim 1, further comprising:
  - 30 a color filter for each pixel.
5. The MOS solid-state imaging element according to claim 4,
  - wherein in a region with lowered resolution among all of the pixels, pixel signals having an identical color component are mixed or averaged and then output.  
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6. The MOS solid-state imaging element according to claim 1,
  - wherein when outputting image signals to the outside, information

expressing a range in which a resolution is to be different in the image and a resolution of the range are added to the image signals before they are output.

7. An imaging device comprising:  
5 the MOS solid-state imaging element according to claim 1.
8. An imaging device comprising the MOS solid-state imaging element according to claim 6, comprising:  
10 a filter portion that executes filter processing with respect to the image signals output from the MOS solid-state imaging element at a boundary between regions having a different resolution;  
wherein the filter portion changes a tap coefficient in conjunction with the spacing of the density in accordance with the information added to the image signals.

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